

UNITED STATES OF AMERICA

TO ALL WHOM IT MAY CONCERN:

BE IT KNOWN THAT I, THEODORE A. WITZEL of 179  
Claremount Avenue, Kitchener, Ontario, Canada, N2M 2P9, Canadian Citizen, have  
invented certain new and useful improvements in

FLAVOR WAVE PLATE FOR BARBECUES AND  
COMBINATION OF FLAVOR WAVE PLATE AND BARBECUE, of which the  
following is a specification:-

## BACKGROUND OF THE INVENTION

### FIELD OF INVENTION

This invention relates to a flavor plate for use in a gas barbecue and to a flavor plate and gas barbecue in combination.

### 5 DESCRIPTION OF THE PRIOR ART

It is known that a flavor plate can be used in place of briquettes or other heat retention means for gas barbecues. It is also known to provide a flavor plate that has three inverted V-shaped sections. Such flavor plates have openings therein to allow heat from a burner of a barbecue to flow  
10 directly from said burner to food being cooked on the grill. While the flavor plates can be used to replace briquettes in a gas barbecue, there is a tendency with previous V-shaped flavor plates for fats and juices from the food being cooked to collect in liquid form between openings extending along a lowermost surface of a valley of the flavor plate. This collection  
15 of fats and juices tends to cause flare ups. Flare ups can be dangerous and can also cause food that is being cooked on the grill of the barbecue to become burned.

### SUMMARY OF THE INVENTION

It is an object of the present invention to eliminate or at least  
20 substantially reduce flare ups that occur when the flavor plate is used in a gas barbecue.

A flavor plate is used in a gas barbecue and is located between a grill and a burner of the barbecue. The flavor plate has at least two inverted V-shaped sections located side by side. The at least two sections  
25 form at least two peaks and one valley. The valley is located between the peaks. The valley has a plurality of spaced first openings along a lowermost surface thereof with a ridge located between each of the openings. The ridge is sized and shaped to cause any fluid on the ridge to flow into at least one of the openings as each ridge is sloped to one or  
30 more first openings located adjacent to each ridge.

A flavor plate and barbecue in combination, the combination comprises a flavor plate mounted between a burner and a grill of the

barbecue. There are no briquettes in the barbecue. The flavor plate has at least two inverted V-shaped sections located side by side relative to one another. The at least two sections form at least two peaks and one valley. The valley has a lowermost surface with spaced first openings extending  
5 along the lowermost surface and ridges located between each of the first openings. The ridges slope down to any first opening on either side of each ridge. The barbecue has a channel to direct a fluid passing through the first openings to a channel to prevent the fluid from dripping onto the burner.

#### BRIEF DESCRIPTION OF THE DRAWINGS

In Figure 1, there is shown a perspective view from a top of a flavor plate;

Figure 2 is a perspective view of a flavor plate from a bottom;

Figure 3 is a sectional end view of the flavor plate of Figures 1 and  
15 2;

Figure 4 is a top view of the flavor plate;

Figure 5 is a sectional view along the lines A-A of Figure 4;

Figure 6 is a perspective partially cutaway portion of a barbecue having a flavor plate mounted therein;

#### DESCRIPTION OF A PREFERRED EMBODIMENT

In Figure 1, a flavor plate 2 has an upper surface 4 with a central inverted V-shaped section 6 and two outer inverted V-shaped sections 8. The sections are located side by side relative to one another and the flavor plate 2 is made of one piece. Preferably, the flavor plate 2 is made from  
25 stainless steel or porcelainized steel. The plate 2 has three peaks 10 and two valleys 12. There are a plurality of first openings 14 extending along a lowermost surface of the valleys 12. The first openings 14 are spaced apart from one another and have an oblong shape. The first openings 14 extend longitudinally along a lowermost surface of each of the valleys 12.  
30 There are a plurality of ridges 16 with one ridge being located between two adjacent first openings 14. It can be seen that there is a ridge located at each end of the plate that is adjacent to only one of the first openings 14.

The plate has outer portions 18 located along each side that extend downward and outward and form part of the outer inverted V-sections 8. The outer portions 18 have a plurality of second openings 20 located therein. The second openings also have an oblong shape but extend  
5 laterally across the outer portions 18. One side edge 22 of the plate 2 has connectors 24 located thereon to enable the plate to be connected into the barbecue (not shown in Figure 1).

In Figure 2, it can be seen that the plate 2 has a lower surface 26. The same reference numerals are used in Figure 2 to describe those  
10 components that are identical to the components of Figure 1 without further description.

In Figure 3, it can be seen that the connectors 24 are located along each of the side edges 22. It can also be seen that the outer portions 18 are longer than the inner portions 28 of the outer V-shaped sections 8. The  
15 ridges 16 are located along the valleys 12 between the central V-shaped section 6 and the outer V-shaped sections 8. The same reference numerals are used in Figure 3 to describe those components that are identical to the components of Figures 1 and 2.

In Figure 4, there is shown a top view of the flavor plate 2. The  
20 same reference numerals are used in Figure 4 to describe those components that are identical to the components of Figures 1, 2 and 3.

Figure 5 is a sectional view of the plate 2 through lines A-A of Figure 4. The same reference numerals are used in Figure 5 to describe those components that are identical to the components of Figure 4.

25 Figure 6 shows the flavor plate and barbecue in combination. In Figure 6, the flavor plate 2 is mounted in a shell of a barbecue 30 between a grill 32 and a burner 34. The lid of the barbecue has been omitted and the shell, grill and burner are conventional. It can be seen that the plate 2 extends between the grill and burner so that any fats and juices that fall on  
30 the plate from food (not shown) being cooked on the grill will flow down the sloped surfaces of the plate. Most of the fats and juices will be vaporized on contact as the plate becomes very hot from the heat of the

burner. The vaporized juices will flavor the food being cooked or  
barbecued. Some of the fats and juices will fall through the openings 14,  
20 where they are channeled to a central collector. The channels and  
collector are not shown. The burner is protected from the fats and juices,  
5 thereby extending the life of the burner. Flare ups are prevented as the fats  
and juices cannot collect anywhere. The ridges 16 prevent the fats and  
juices from pooling along the lowermost surface of the valleys. The flavor  
plate evenly distributes the heat from the burner throughout the barbecue.  
The first openings and the second openings allow a direct path from the  
10 burner to the food being cooked. The connectors 24 line up with ribs (not  
shown) in the barbecue allowing for easy installation of the plate.

The briquettes and wire briquette grate are eliminated from the  
barbecue and replaced by the flavor plate.